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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|-----------------|-------------|------------------------|---------------------|------------------|
| 10/039,175 | 12/31/2001 | Michael Leon Feilmeier | 80252-0183 | 7161 |

20480 7590 11/19/2003

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EXAMINER

PAPPAS, PETER

| ART UNIT | PAPER NUMBER |
|----------|--------------|
|----------|--------------|

2671

DATE MAILED: 11/19/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/039,175

Applicant(s)

FEILMEIER ET AL.

Examiner

Peter-Anthony Pappas

Art Unit

2671

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 31 December 2001.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-33 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-33 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 31 December 2001 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☒ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 6.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 1-3, 5-6 and 25-27 are rejected under 35 U.S.C. 102(b) as being anticipated by Handbook for the Palm VII Organizer, referred to herein as Palm (<http://www.palmone.com/us/support/handbooks/palmvii.pdf>).

3. In regards to claim 25 Palm discloses:

(a) detecting the placement of an input device on the screen; and

- Calibration aligns the internal circuitry of your organizer with its touch-sensitive screen so that when you tap an element on the screen, the organizer can detect exactly which task you want to perform. See Chapter 1, page 18.

(b) saving data corresponding to a position of the input device when the input device is lifted from the screen.

- When you lift the stylus from the screen, your organizer recognizes your stroke immediately and prints the letter at the insertion point on the screen. See Chapter 2, page 33.

4. It is noted that while the reference does not explicitly disclose the saving of data in correspondence to the position of the input device, it does disclose that a printed letter is displayed in correspondence to the lifting of the input device. As such it is

inherent that data is involved in some fashion and as such must be stored in memory – regardless of what that memory consists of.

5. In regards to claim 26 the rationale provided in the rejection of claim 25 is incorporated herein.

6. In regards to claim 27 Palm discloses:

(a) importing an original file from a main computer into a memory in the portable computing device;

- Importing data. If you have data stored in computer applications such as spreadsheets and databases, or if you want to import data from another organizer, you can transfer the data to your organizer without having to key it in manually. Save the data in one of the file formats listed below (see reference), import it into Palm Desktop software, and then perform a HotSync operation to transfer the data to your organizer. See Chapter 3, page 42.

(b) detecting modifications of the original file made through the portable computing device; and

(c) storing the modifications to the original file.

7. Changes made to your organizer are transferred to your Palm Desktop software and vice versa. The first HotSync operation takes a little time, “but after that, HotSync operations happen quickly because only changes are synchronized.” See Chapter 4, page 67.

8. In regards to claim 1 Palm discloses:

- (a) a user interface having a touch-sensitive display that detects contact between an input device and the display;**
- (b) a processor; and**
- (c) a memory that stores a data selection, wherein the processor detects a position of the input device when the input device is removed from the display and stores the data selection corresponding to the position in the memory.**

9. It is noted that at the time of the applicant's invention, portable computing devices can include one or more processors, memory, in any variety of given forms (optical, RAM, ROM, etc.), and an interface supporting a touch-sensitive display(s).

10. In regards to claim 2 Palm discloses:

The portable computing device of claim 1, wherein the input device a stylus.

- See Chapter 1, page 7.
- See Chapter 2, page 31.

11. In regards to claim 3 Palm discloses:

The portable computing device of claim 1, wherein the user interface further comprises at least one selected from the group consisting of at least one directional button, a rotary switch, and a rocker arm.

- See Chapter 1, pages 5-6 – "Scroll button."

12. In regards to claim 5 Palm discloses:

The portable computing device of claim 1, further comprising a data communication port for importing data to and exporting data from the memory.

- IR Port. See Chapter 1, pages 5-6, and Chapter 8, page 187.
- Serial Port. See Chapter 1, pages 7-8.

13. In regards to claim 6 Palm discloses:

The portable computing device of claim 5, wherein the data communication port is at least one selected from the group consisting of a wireless data port and a wired data port.

- The rationale provided in the rejection of claim 5 is incorporated herein.
- Wireless. See About This Book, page 1. Chapter 1, pages 5-6. Chapter 1, pages 14-15. Chapter 5, page 121.

14. Wired. Chapter 1, page 8.

Claim Rejections - 35 USC § 103

15. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

16. Claims 3 and 4 are rejected under 35 U.S.C. 103(a) as being unpatentable over Palm as applied to claims 1-2 and 25-27, and further in view of Kato et al. (U.S. Patent No. 6, 297, 795).

17. In regards to claim 3:

The portable computing device of claim 1, wherein the user interface further comprises at least one selected from the group consisting of at least one directional button, a rotary switch, and a rocker arm.

18. In regards to claim 4:

The portable computing device of claim 3, wherein the rotary switch is movable in both a rotary direction and in a linear direction.

19. In regards to claims 3 and 4 Palm fails to disclose a rotary switch and a rotary switch which is movable in both a rotary direction and in a linear direction.

20. Kato et al. discloses:

- See Figs. 1-4.
- The available manipulations using the rotary switch are "rotation", "pressing", "continuous pressing" and "pressing and rotation." See column 8, lines 66-67, column 9, lines 1, and Fig. 4, 12.

21. It would have been well known to one skilled in the art, at the time of the applicant's invention, to employ the use of a rotary switch, movable in both a rotary and linear direction, as a viable, quick and conventional form of input for a portable computing device. Thus, it would have been obvious, to one skilled in the art, to incorporate said rotary switch in place of the scroll button disclosed by Palm, because of it's viable, quick and conventional nature in regards to aiding input into a portable computing device.

22. Claims 7-10, 12-16, 20-23, 28 and 31-32 are rejected under 35 U.S.C. 103(a) as being unpatentable over Palm as applied to claims 1-6 and 25-27, and further in view of

Remote Engineering Homepage

(<http://web.archive.org/web/19991013091843/http://pocketcad.com>).

23. In regards to claim 7:

The portable computing device of claim 1, further comprising a portable computer aided design (CAD) program in the memory.

24. Palm further discloses:

- You can also install additional applications on your organizer, such as games and other software, including more query applications. See Chapter 3, page 48.

25. Palm fails to explicitly disclose a computer aided design (CAD) program in memory.

26. Remote Engineering Homepage discloses:

- PocketCAD. The full-featured CAD software for Windows CE. See page 1.
- PocketCAD product for Handheld PC's running Windows CE 2.0. See page 2.
- PocketCAD is a highly mobile, full-featured CAD package. See page 8.

27. It would have been well known to one skilled in the art, at the time of the applicant's invention, that for any piece of published software, CAD specific, mobile or not, in design it must reside in one form of memory or another (be it a optical disc(s) or RAM) for it to be able to be utilized. Thus, it would have been obvious to store a portable aided design (CAD) program in memory, because otherwise the software would not be presented in a functional form. Furthermore, the Remote Engineering Homepage discloses that it was known, at the time of the applicant's invention, to use CAD software on portable devices.

28. In regards to claim 8:

The portable computing device of claim 7, wherein the portable CAD program complements a desktop CAD program on a personal computer such that data can be exchanged between the portable CAD program and the desktop CAD program.

29. Palm further discloses:

- When your organizer is in the cradle, and the cradle is connected to your computer, you can use HotSync technology to do a two-way exchange of the data on your organizer and your computer. See Chapter 1, page 8.
- Palm Desktop software extends many of the functions of your organizer to your computer and serves to back up all your data. Viewing and editing your data using Palm Desktop software is optional. However, when you use it with your organizer and the built-in HotSync technology, you can fully synchronize the information on your organizer with the information on your computer. See Chapter 1, page 12.

30. Palm fails to explicitly disclose the CAD software component to said exchange.

31. Remote Engineering Homepage discloses:

- Included with PocketCAD is Remote Engineering's new PocketDWG Filter version 2.0 which allows users to drag and drop files between their Windows CE devices and their desktop. PocketDWG is based on AutoDesk technology and handles the conversion between the desktop and PocketCAD. See page 2.

- To be mobile you need to get your drawing files off your desktop computer and on to your HPC. With PocketDWG all you do is drag files from your Windows Explorer to your HPC Explorer and PocketDWG handles the rest. Use PocketVIEW to add redlines and save. Then drag and drop the .CAD file from your HPC to your desktop. See page 6.
- See page 7, Fig. 3.

32. In regards to claim 9 the rationale provided in the rejection of claim 8 is incorporated herein.

33. In regards to claim 10 the rationale provided in the rejection of claim 8 is incorporated herein.

34. In regards to claim 12:

The portable computing device in claim 7, wherein the portable CAD program comprises at least one selected from the group consisting of drawing tools, block tools, editing tools, and inquiry tools.

35. Remote Engineering Homepage discloses:

- PocketCAD is a full-featured CAD package with Drawing Tools to create Lines, Arcs, Circles, Text, Blocks and Dimensions. See page 2.
- Edit Tools consist of Delete, move, Copy, Rotate, Trim and Extend. See page 2.

36. In regards to claim 13:

(a) a main computer that runs a desktop CAD program;

37. Palm fails to explicitly disclose a computer that runs a desktop CAD program.

38. Remote Engineering Homepage discloses:

- To be mobile you need to get your drawing files off your desktop computer and on to your HPC. Once the filter is installed all you have to do is drag you DWG/DXF file from your Windows Explorer to your HPC Explorer. See page 6.

39. It would have been well known to one skilled in the art, at the time of the applicant's invention, that it would be conventional for AutoCAD and/or generic CAD drawing files (DWG) along with drawing interchange (exchange) files (DXF) to be created through the use of a desktop CAD program, running on a computer system. Thus, it would have been obvious to use such a apparatus as a desktop computer with accompanying CAD software, as disclosed above, to construct said DWG and/or DXF files.

40. In addition it would have been well known, at the time of the applicant's invention, to use said main computer running, for example, a desktop CAD program with a portable computing device, as disclosed by Palm, due to the disclosed nature of portable computer devices – in particular how they interact with a (main) computer system(s) to transfer data between one another through any variety of communications ports. Thus, it would have been obvious to couple a (main) computer system with a portable computing device, where the software on both of these units is shared so to allow for ease of portability of related data.

(b) at least one portable computing device that runs a portable CAD program; and

- The rationale provided in the rejection of claim 7 is incorporated herein.

(c) a communication link between the main computer and the at least one portable computing device, wherein the portable CAD program and the desktop CAD program are complementary to allow data to be exchanged between the main computer and the portable computing device.

- The rationale provided in the rejection of claim 8 is incorporated herein.

41. In regards to claim 14 the rationale provided in the rejection of claim 12 is incorporated herein.

42. In regards to claims 15 and 16 the rationale provided in the rejection of claim 11 is incorporated herein.

43. In regards to claim 20 the rationale provided in the rejection of claim 6 is incorporated herein.

44. In regards to claim 21, the rationale provided in the rejection of claim 1 is incorporated herein.

45. In regards to claim 22, the rationale provided in the rejection of claim 2 is incorporated herein.

46. In regards to claim 23, the rationale provided in the rejection of claim 3 is incorporated herein.

47. In regards to claim 28, the rationale provided in the rejection of claim 7 is incorporated herein.

48. In regards to claim 31, the rationale provided in the rejection of claim 12 is incorporated herein.

49. In regards to claim 32:

The method of claim 31, wherein the tools include the step of automatically repositioning a drawing on the screen responsive to movement of the input device.

50. Palm fails to explicitly disclose that tools include the step of automatically repositioning a drawing on the screen responsive to movement of the input device.

51. Remote Engineering Homepage discloses:

- Edit Tools consist of Delete, Move, Copy, Rotate, Trim and Extend. See page 8.
- The Move Command. This command will move a selection of entities a distance and direction as defined by two picked points. When picked PocketCAD waits for two points to be entered to define the distance and direction to move the selection set. Multiple objects may be selected, and they will be moved together in exactly the same relationship as they are current placed. See page 20 and page 19, Fig. 5.

52. In regards to claim 33:

53. Palm fails to explicitly disclose generating a user interface for entering a base point and at least one of a distance and a direction relative to the base point.

54. Remote Engineering Homepage discloses:

The method of claim 31, further comprising: generating a user interface for entering a base point and at least one of a distance and a direction relative to the base point.

- See page 8, Fig 4.
- Drawing Tools to create Lines, Arcs, Circles, Text and Blocks. See page 8.

- Drawing. Creating Circles with Center Point and Radius. This command will create circles via a center point and a radius. The first point requested is the center point. The next point will set the radius distance. See page 9.

55. Claims 11, 17 and 29 are rejected under 35 U.S.C. 103(a) as being unpatentable over Palm and Remote Engineering Homepage as applied to claims 1-10, 12-16, 20-23, 25-28 and 31-33, and further in view of Carter (U.S. Patent No. 5, 907, 705).

56. In regards to claim 11:

The portable computing of claim 9, wherein the processor record changes made to the original file in the portable computing device in a script file.

57. Palm and Remote Engineering Homepage fail to explicitly disclose changes made to the original file being stored in a script file.

58. Carter discloses :

- The SCCS system stores original RTI files, but does not store changed RTI files per se. Instead, the system stores changes to an original .html file in the SCCS file as a "delta", which consists of only the changes themselves. See column 8, lines 25-28.

59. It would have been well known to one skilled in the art, at the time of the applicant's invention, to allow for alternative means of saving data to memory where various versions and types of files are being used – for reasons of compatibility, expandability and usability. Thus, it would have been obvious to implement an alternative means of data storage in a portable computing system running CAD

software (for example), so to allow for compatibility with various CAD (file) formats and the like.

60. In regards to claim 17:

61. Remote Engineering Homepage discloses:

The system of claim 16, wherein the original CAD file is a native format and the at least one of the modified CAD file and the script file is in a portable format, and wherein the system further comprises a filter that converts the copied original CAD file from the native format to the portable format and converts at least one of the modified CAD file and the script file from the portable format to the native format.

- With PocketDWG Filter all you do is drag your files from your Windows Explorer to your PC Explorer and Pocket SWG handles the rest. Once the filter is installed all you have to do is drag your DWG/DXF file from your Windows Explorer to your HPC Explorer. The result will be a .CAD file on your HPC for use with PocketVIEW. Use PocketVIEW to add redline and save. Then drag and drop the .CAD file from your HPC to your desktop. The result will be a DXF file with the same name as your DWG file. See page 6.

62. In addition the rationale provided in the rejection of claims 10 and 11 are incorporated herein.

63. It is noted that process disclosed above by Remote Engineering Homepage is understood to consist of three stages of data, in which the data exists in memory: (1) DWG/DWF (both typical tradition types of CAD file formats) file(s) stored in a native

format, on a computer system for example, (2) CAD file(s) stored in a portable format, on a portable computer system for example, and (3) DXF files(s) stored in a native format, on a computer system for example. The filter and/or process by which this is accomplished is disclosed above as PocketDWG Filter.

64. In regards to claim 29, the rationale provided in the rejection of claim 11 is incorporated herein.

65. Claim 24 is rejected under 35 U.S.C. 103(a) as being unpatentable over Palm and Remote Engineering Homepage as applied to claims 1-17, 20-23, 25-29 and 31-33, and further in view of Kato et al. (U.S. Patent No. 6, 297, 795).

66. The rationale provided in the rejection of claim 4 is incorporated herein.

67. Claims 18 and 30 are rejected under 35 U.S.C. 103(a) as being unpatentable over Palm, Remote Engineering Homepage and Carter as applied to claims 1-17, 20-29 and 31-33, and further in view of Echerer et al. (U.S. Patent No. 5, 384, 862).

68. In regards to claim 18:

The system of claim 17, wherein the main computer plays the converted script file against the original CAD file in the main computer to generate a modified CAD file in the native format in the main computer.

69. Palm discloses:

- Changes made to your organizer are transferred to your Palm Desktop software and vice versa. The first HotSync operation takes a little time, but after that, HotSync operations happen quickly because only changes are synchronized.

See Chapter 4, page 67.

70. Remote Engineering Homepage discloses in claim 17 the application of said script file through a filter.

71. Carter et al. discloses in claim 11 the creation of said script file.

72. Palm, Remote Engineering Homepage and Carter fail to disclose the use of said script file to combine itself with an original file to generate a modified file.

73. Echerer discloses:

- From either a scanner, a modem, or a disk on which an image has been stored, a series of binary values is received and converted to a bitmap. Identifying information is affixed to the received image. The affixed information includes: the patient's name and number, the name of the doctor assigned to the case, the doctor's identification number, the date of the X-ray, and perhaps the X-ray description. The bitmap is stored in such a way that changes are inhibited and then displayed on a high resolution monitor. The image displayed is processed in a manner to be described in more detail presently. However, the processing enhances the image displayed and extracts information from the image as a result of an interchange of instructions and responses between CPU and user. The enhancements and information are stored in a second memory location, separate from the bitmap. A report is prepared using the information and the image together with its enhancements and/or without them; the report is stored in a third memory location and also printed on the laser printer or possibly transmitted by modem to a remote user. See column 6, lines 17-37.

74. It would have been well known to one skilled in the art, at the time of the applicant's invention, that due to memory constraints with portable systems and rate of communication (port) transfer speeds to break down information into components whenever possible so to only allow for the transfer of what is relevant at the time. This has been previously disclosed by Palm, Remote Engineering Homepage and Carter. Thus, it would have been obvious to allow for not only the deconstruction of elements into components, to aid in the delivery of these elements, but to also reconstruct said elements, from their deconstructed components, using a method and presentation that best suits the relevant need at that given time.

75. In regards to claim 30:

(a) converting the original file from the importing step from the native format to the portable format;

- The rationale provided in the rejection of claim 10 is incorporated herein.

(b) converting the at least one of the modified CAD file and the script file from the portable format to the native format; and

- The rationale provided in the rejection of claim 17 is incorporated herein.

(c) loading the at least one of the modified CAD file and the script file to the main computer.

- The rationale provided in the rejection of claim 18 is incorporated herein.

76. Claim 19 is rejected under 35 U.S.C. 103(a) as being unpatentable over Palm and Remote Engineering Homepage as applied to claims 1-18, 20-29 and 30-33, and further in view of Echerer et al. (U.S. Patent No. 5, 384, 862).

77. The rationale provided in the rejection of claim 18 is incorporated herein.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Peter-Anthony Pappas whose telephone number is 703-305-8984. The examiner can normally be reached on M-F 9:45am-6:15pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Joseph Mancuso can be reached on 703-305-3885. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-305-3900.

PAP

Peter-Anthony Pappas
Examiner
Art Unit 2671

JOSEPH MANCUSO
PRIMARY EXAMINER